

FY22 Coastal Resilience Grant Program

Pre-RFR Webinar
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Goals

- Address known coastal flooding and shoreline erosion issues
- Adapt to future climate conditions (Sea level rise, precipitation)
- Protect public facilities and infrastructure assets
- Provide broad public benefits and access



Support for Local Adaptation (2014-present)

- Applications submitted: 251
- Applications funded: 155
- State funding requested: \$41 million
- State funding awarded: \$21 million
- Local match committed: \$9 million

FY22: Applicants able to request up to \$1 million/project.

Anticipated FY22 Timeline

RFR Released on Commbuys	April 2021
Q&A (Submit questions in writing; Q&A posted online)	+2 weeks
Electronic applications due to coastal.resilience@mass.gov	May – June (+6 weeks after release)
Award announcement	July - Aug.
Project scoping and contract execution	Aug. - Sept.
Project start date (Date of EEA's signature)	Sept.
Project end	June 2022 – June 2023

Eligibility

Applicants

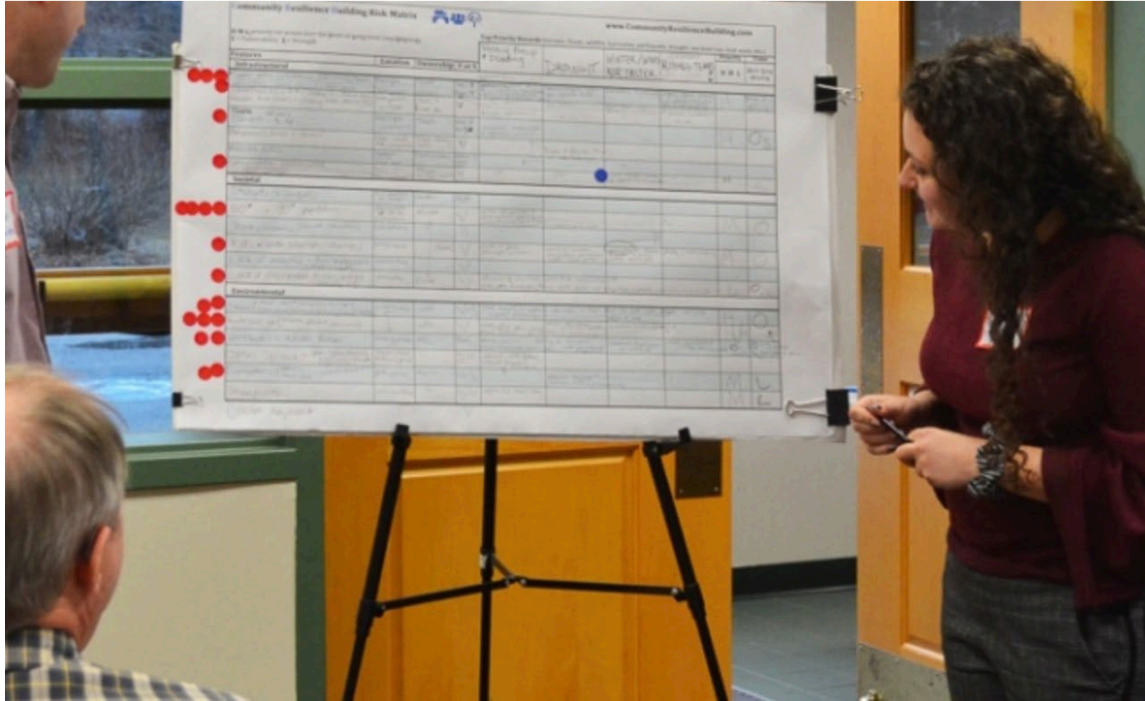
- 78 coastal cities and towns
 - All project types #1-5
 - Local or multi-community (regional)
- Nonprofits that own vulnerable coastal property that is open and accessible to the public
 - Project types **#2, 3, and 5**

Projects

1. Detailed vulnerability and risk assessment
2. Public education and communication
3. Proactive planning
4. Redesigns and retrofits
5. Shoreline restoration

All:

- Public engagement including interpretation & translation services (if applicable)
- Transferable deliverables
- Communicate lessons learned



1. Detailed Risk and Vulnerability Assessment

- Build off Municipal Vulnerability Preparedness (or similar) planning priorities to map and evaluate vulnerable public facilities and infrastructure
- Assess natural resources at risk
- Use best available climate projections
- Provide meaningful public engagement opportunities





2. Public Education and Communication

- Increase public understanding and awareness of coastal storm and climate impacts
- Build effective local and regional partnerships to reach broader audiences and develop support for proactive measures
- Develop creative communication products that are accessible to all residents

3. Proactive Planning

- Reduce exposure of vulnerable facilities and infrastructure through proactive planning and resilient land use management
 - Local ordinances, bylaws, standards zoning, adaptation planning, retreat
 - Community outreach with residents, businesses and other stakeholders and result in formal local adoption





4. Redesigns and Retrofits

- Relocate vulnerable public facilities and infrastructure outside of hazardous areas
- Explore nature-based alternatives
- Redesign and retrofit vulnerable public facilities and infrastructure to reduce flooding and erosion over the design life
 - Port and harbor infrastructure
 - Water/Wastewater infrastructure
 - Critical roadways, evacuation routes and associated infrastructure
 - Seawalls



5. Shoreline Restoration

- Non-structural approaches that restore or enhance natural systems to provide increased shoreline stabilization and flood control
 - Beach, berm, or dune building
 - Coastal bank stabilization
 - Fringing salt marsh restoration
 - Living breakwater or sill construction

Project Phases



Planning,
feasibility
assessment,
siting



Design



Permitting



Construction
and
Maintenance



Evaluation Criteria

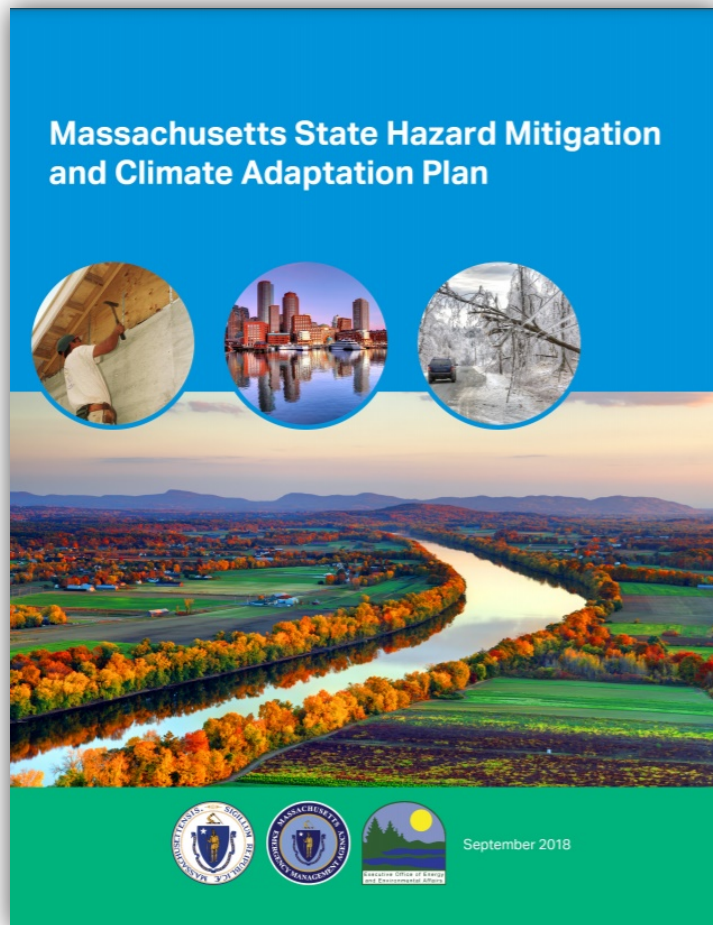
- Current vulnerability and management approach
- Climate impact and future vulnerability
- Need for assistance and Environmental Justice considerations
- Detailed project description
 - Clearly articulate how project approach addresses known flooding and erosion impacts
 - Describe how project builds off previous work
 - Assume reviewers do not have knowledge of project
- Public benefit and interests
 - Describe benefits at the site and beyond and for residents and visitors of the community and Commonwealth



Evaluation Criteria

- Transferability
- Timeline
 - One or two-year projects, broken down by tasks and fiscal year
 - Preference for one-year projects
- Detailed Budget
 - Local match can be cash and/or in-kind services (25% of total project cost)
- Project management and partners
 - Strong letters of support from stakeholders, community members

Climate projections and data at resilientma.org



Sea level rise



4 to 10.5 feet
by 2100



[← Back to Search Results](#)

Massachusetts Climate Change Projections - Statewide and for Major Drainage Basins

March 2018
Documents / Report

Temperature, Precipitation, and Sea Level Rise Projections

PDF

by [Northeast Climate Adaptation Science Center](#)

Published by [Massachusetts Executive Office of Energy and Environmental Affairs](#)

Researchers from the Northeast Climate Adaptation Science Center at the University of Massachusetts Amherst developed downscaled projections for changes in temperature, precipitation, and sea level rise for the Commonwealth of Massachusetts. The Executive Office of Energy and Environmental Affairs has provided support for these projections to enable municipalities, industry, organizations, state government and others to utilize a standard, peer-reviewed set of climate change projections that show how the climate is likely to change in Massachusetts through the end of this century.

The downscaled, or localized, temperature and precipitation projections are based on simulations from the latest generation of climate models from the International Panel on Climate Change and scenarios of future greenhouse gas emissions. The models were carefully selected from a larger ensemble of climate models based on their ability to

BUZZARDS BAY BASIN

Buzzards Bay Basin		Observed Baseline 1971-2000 (°F)	Projected Change in 2030s (°F)		Mid-Century Projected Change in 2050s (°F)		Projected Change in 2070s (°F)		End of Century Projected Change in 2090s (°F)	
Average Temperature	Annual	50.7	+1.9	to +3.6	+2.6	to +5.9	+3.0	to +8.5	+3.3	to +10.3
	Winter	31.3	+2.1	to +4.2	+2.8	to +6.4	+3.3	to +8.5	+3.6	to +9.8
	Spring	47.3	+1.9	to +3.6	+2.6	to +5.7	+2.8	to +7.6	+3.3	to +9.2
	Summer	70.1	+1.6	to +3.7	+2.1	to +6.1	+2.6	to +9.4	+3.1	to +11.2
Maximum Temperature	Fall	53.6	+2.0	to +4.1	+3.2	to +6.1	+3.0	to +8.7	+3.5	to +10.7
	Annual	59.5	+1.8	to +3.6	+2.4	to +5.8	+2.7	to +8.5	+3.0	to +10.2
	Winter	39.7	+1.8	to +4.0	+2.4	to +5.9	+2.9	to +7.8	+3.3	to +9.1
	Spring	56.3	+1.8	to +3.5	+2.2	to +5.4	+2.7	to +7.6	+3.2	to +9.1
Minimum Temperature	Summer	79.2	+1.5	to +3.6	+1.9	to +6.1	+2.5	to +9.3	+2.9	to +11.2
	Fall	62.6	+1.9	to +4.1	+3.0	to +6.2	+2.9	to +8.6	+3.3	to +10.9
	Annual	41.8	+2.0	to +3.7	+2.8	to +6.0	+3.2	to +8.5	+3.6	to +10.4
	Winter	22.8	+2.4	to +4.4	+3.1	to +6.9	+3.7	to +9.1	+4.0	to +10.5
	Spring	38.4	+1.9	to +3.7	+2.9	to +5.9	+2.8	to +7.8	+3.4	to +9.2
	Summer	61.1	+1.7	to +3.8	+2.2	to +6.2	+2.7	to +9.3	+3.4	to +11.3
	Fall	44.7	+2.0	to +4.3	+3.3	to +6.1	+3.1	to +8.8	+3.7	to +10.7

Interactive viewer



Resilient MA

Climate Change Clearinghouse for the Commonwealth

SEARCH

MENU

☒ Layers

☒ Controls & Legends 2

☐ Quick Zoom

[Collapse All](#) [Hide All](#) [Remove All](#)

Sea Level Rise

Year: 2070

Scenario:

Legend: ■ Relative Mean Sea Level (feet NAVD88)

Sea Level Rise & Coastal Flooding (NOAA)

Opacity: 80%

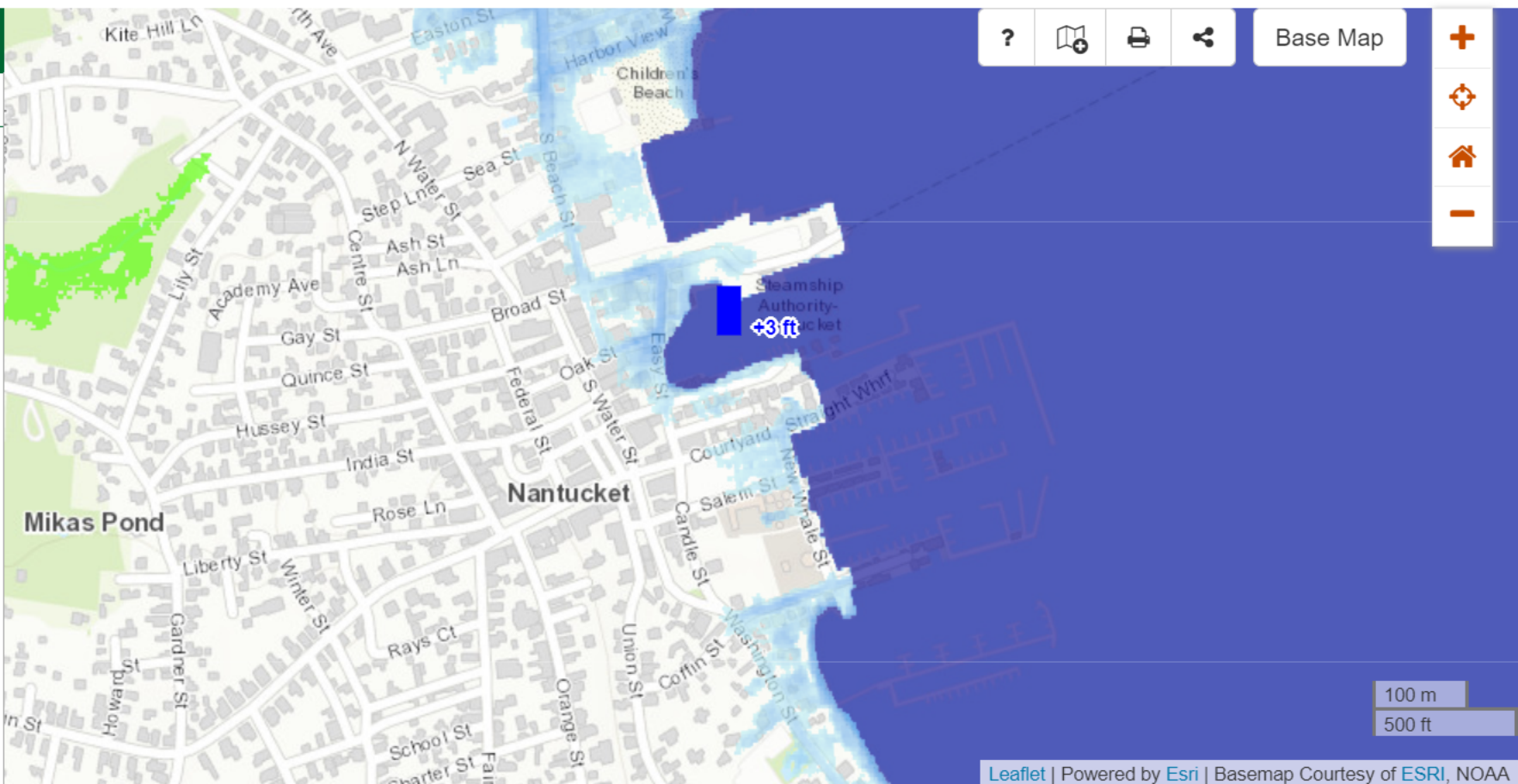
Predicted Rise: 3 ft.

Layer:

Water Depth

■ Low-lying Areas

■ Area Not Mapped



Resources

[CZM StormSmart Coasts](#)

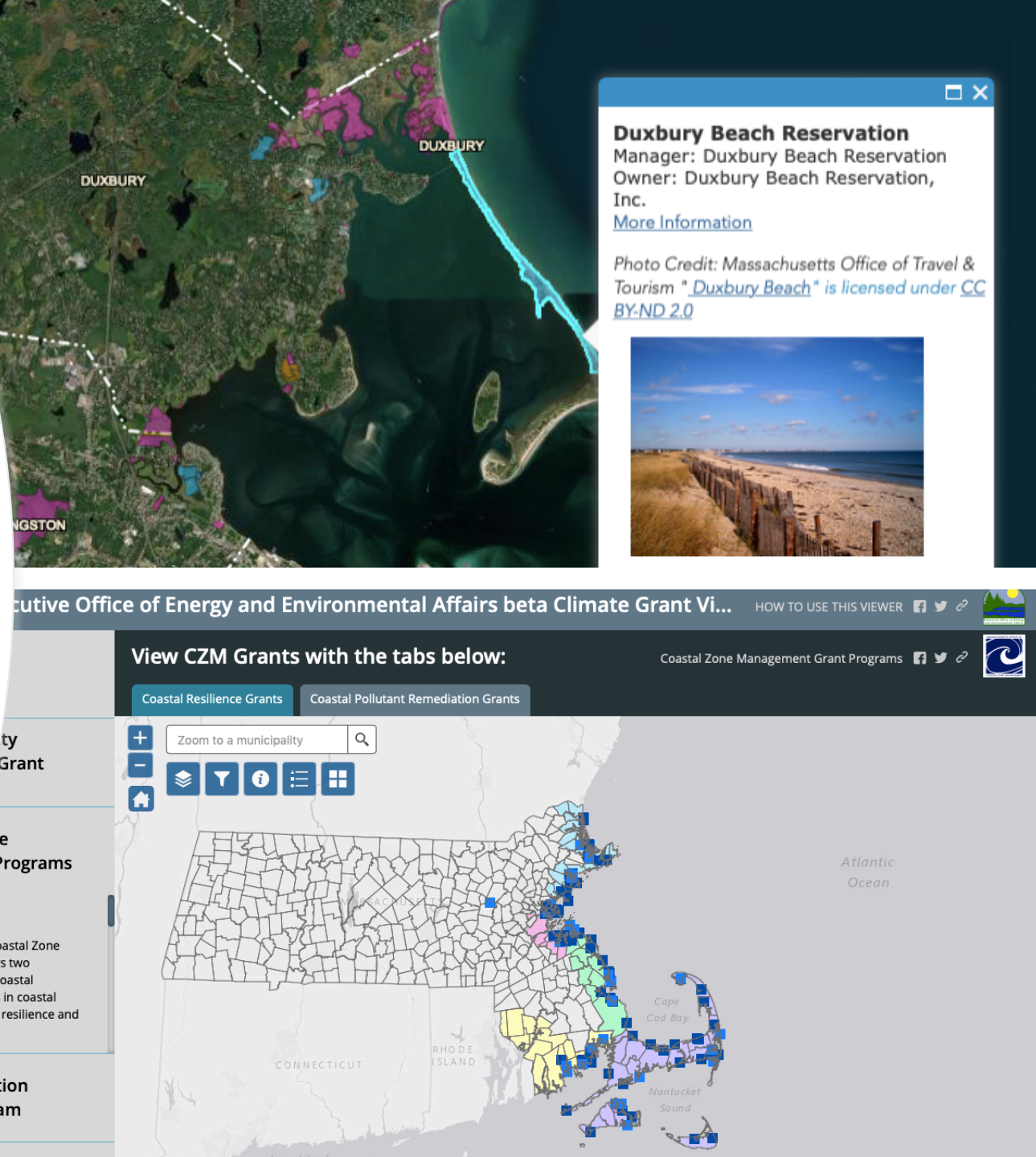
- Grant Program information and CZM grant viewer
- Fact Sheets

[CZM Coast Guide Online](#)

- Interactive map of public access sites

[MA Climate Change Clearinghouse](#) (resilientma.org)

- Downscaled climate projections and data
- EEA grant viewer





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